

IN THE CLAIMS

1. (Currently Amended) A power supply device, comprising:
a rectification section for rectifying an input AC voltage;
a primary side capacitor for smoothing an output voltage from said rectification section;
a switching power supply section for receiving a DC voltage from said primary side capacitor as an input voltage at a primary side thereof, switching the inputted DC voltage and generating a stabilized output DC voltage at a secondary side thereof isolated from the primary side; ~~and~~
~~a current detection section~~ a photo-coupler having a photodiode and a phototransistor
wherein said photodiode is connected between said rectification section and said primary side capacitor for detecting a supply current supplied from said rectification section, and wherein said phototransistor for generating a detection signal is isolated from said primary side in response to said detected supply current to said switching power supply section; said current detection section generating the detection signal isolated from the primary side and for conveying the detection signal to an equipment connected to the secondary side of said switching power supply section.

Claims 2-4. (Canceled)

5. (Currently Amended) An electronic equipment, comprising:

a rectification section for rectifying an input AC voltage;

a primary side capacitor for smoothing an output voltage from said rectification section;

a switching power supply section for receiving a DC voltage from said primary side capacitor as an input voltage at a primary side thereof, switching the inputted DC voltage and generating a stabilized output DC voltage at a secondary side thereof isolated from the primary side;

~~a current detection section~~ a photo-coupler having a photodiode and a phototransistor wherein said photodiode is connected between said rectification section and said primary side capacitor for detecting a supply current supplied from said rectification section, and wherein said phototransistor for generating a detection signal is isolated from said primary side in response to said detected supply current to said switching power supply section;

an operation circuit for operating using the output DC voltage outputted from said switching power supply section as a voltage source; and

a control section for operating using the output DC voltage outputted from said switching power supply section as a voltage source to control said operation circuit;

~~said current detection section generating the detection signal isolated from the primary side and conveying the detection signal to said control section;~~

said control section performing an operation ending process of said operation circuit in response to the detection signal from said photo-coupler.

Claims 6-8. (Canceled)